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## FACSIMILE COVER SHEET

TOTAL NUMBER OF PAGES BEING SENT: 9

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DATE: May 31, 2007

TO: Examiner Unknown  
Group Art Unit 1762

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612.746.3006 faxApplication No.: 10/561,804  
Applicant: SPRIESTERSBACH et al.  
Due Date: None

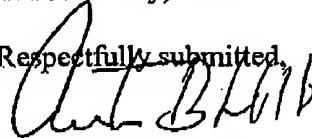
OUR REF.: 3581.09US01

FROM: Curtis B. Herbert, Ph.D.  
PHONE #: 612-605-1038

Attached please find the following for filing in the above-identified application.

- (1) Communication; and
- (2) English translation of the PCT International Preliminary Report on Patentability  
(Chapter I of the Patent Cooperation Treaty) mailed June 22, 2006.

Respectfully submitted,

  
Curtis B. Herbert, Ph.D.  
Registration No. 43,443

## CERTIFICATE OF FACSIMILE TRANSMISSION

I hereby certify that this paper is being transmitted by facsimile to the U.S. Patent and Trademark Office, Fax No. 571-273-8300  
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PATENT APPLICATION

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re the application of:

Attorney Docket No.: 3581.09US01

SPRIESTERSBACH et al.

Confirmation No.: 1109

Application No.: 10/561,804

Examiner: Unknown

Filed: June 26, 2006

Group Art Unit: 1762

For: MULTI-LAYERED SURFACE PROTECTION FOR REINFORCED CONCRETE

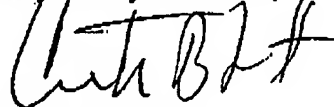
COMMUNICATION

Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

Sir:

Applicants hereby submit an English translation of the PCT International Preliminary Report on Patentability (Chapter I of the Patent Cooperation Treaty) mailed June 22, 2006.

Respectfully submitted,



Curtis B. Herbert  
Registration No. 45,443

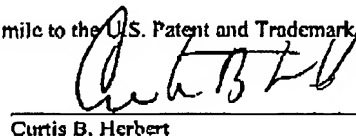
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MAY 31, 2007  
Date

  
Curtis B. Herbert

## PATENT COOPERATION TREATY

PCT/EP2004/007217

**PCT**

NOTIFICATION OF TRANSMITTAL  
OF COPIES OF TRANSLATION  
OF THE INTERNATIONAL PRELIMINARY REPORT  
ON PATENTABILITY  
(CHAPTER I OR CHAPTER II  
OF THE PATENT COOPERATION TREATY)  
(PCT Rules 44bis.3(c) and 72.2)

From the INTERNATIONAL BUREAU

To:

MEYERS, Hans-Wilhelm  
Postfach 10 22 41  
50462 Köln  
ALLEMAGNE

047605758

AK	Sg	W	Da	Hi	HP	ME	TW	JH	KB
28. JUNI 2006									
CS	K								

Date of mailing (day/month/year) 22 June 2006 (22.06.2006)	
Applicant's or agent's file reference 041170woMenn	IMPORTANT NOTIFICATION
International application No. PCT/EP2004/007217	International filing date (day/month/year) 02 July 2004 (02.07.2004)
Applicant GRILLO-WERKE AG et al	

## 1. Transmittal of the translation to the applicant.



The International Bureau transmits herewith a copy of the English translation of the international preliminary report on patentability (Chapter I).



The International Bureau transmits herewith a copy of the English translation of the international preliminary report on patentability (Chapter II).

## 2. Transmittal of the copy of the translation to the designated or elected Offices.

The International Bureau notifies the applicant that copies of that translation have been transmitted to the following designated or elected Offices requiring such translation:

None

The following designated or elected Offices, having waived the requirement for such a transmittal at this time, will receive copies of that translation from the International Bureau only upon their request:

AE, AG, AL, AM, AP, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EA, EC, EE, EG, EP, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OA, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW

## 3. Reminder regarding translation into (one of) the official language(s) of the elected Office(s).

The applicant is reminded that, where a translation of the international application must be furnished to an elected Office, that translation must contain a translation of any annexes to the international preliminary report on patentability (Chapter II).

It is the applicant's responsibility to prepare and furnish such translation directly to each elected Office concerned within the applicable time limit (Rule 74.1). See Volume II of the PCT Applicant's Guide for further details.

The International Bureau of WIPO  
34, chemin des Colombettes  
1211 Geneva 20, Switzerland

Authorized officer

Ellen Moyse

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## PATENT COOPERATION TREATY

## PCT

INTERNATIONAL PRELIMINARY REPORT ON PATENTABILITY  
(Chapter I of the Patent Cooperation Treaty)

(PCT Rule 44bis)

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Applicant's or agent's file reference 041170woMenn	FOR FURTHER ACTION		See item 4 below
International application No. PCT/EP2004/007217	International filing date (day/month/year) 02 July 2004 (02.07.2004)	Priority date (day/month/year) 03 July 2003 (03.07.2003)	
International Patent Classification (8th edition unless older edition indicated) See relevant information in Form PCT/ISA/237			
Applicant GRILLO-WERKE AG			

1. This international preliminary report on patentability (Chapter I) is issued by the International Bureau on behalf of the International Searching Authority under Rule 44 bis.1(a).
2. This REPORT consists of a total of 6 sheets, including this cover sheet.
- In the attached sheets, any reference to the written opinion of the International Searching Authority should be read as a reference to the international preliminary report on patentability (Chapter I) instead.

3. This report contains indications relating to the following items:

- |  |   |
|--|---|
| <input checked="" type="checkbox"/> Box No. I  | Basis of the report   |
| <input checked="" type="checkbox"/> Box No. II | Priority  |
| <input type="checkbox"/> Box No. III           | Non-establishment of opinion with regard to novelty, inventive step and industrial applicability  |
| <input type="checkbox"/> Box No. IV            | Lack of unity of invention  |
| <input checked="" type="checkbox"/> Box No. V  | Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement |
| <input type="checkbox"/> Box No. VI            | Certain documents cited   |
| <input type="checkbox"/> Box No. VII           | Certain defects in the international application  |
| <input type="checkbox"/> Box No. VIII          | Certain observations on the international application   |

4. The International Bureau will communicate this report to designated Offices in accordance with Rules 44bis.3(c) and 93bis.1 but not, except where the applicant makes an express request under Article 23(2), before the expiration of 30 months from the priority date (Rule 44bis .2).

The International Bureau of WIPO 34, chemin des Colombettes 1211 Geneva 20, Switzerland  Facsimile No. +41 22 740 14 35	Date of issuance of this report 12 June 2006 (12.06.2006)
	Authorized officer  Ellen Moyse  Telephone No. +41 22 338 89 75

Form PCT/IB/373 (January 2004)

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PATENT COOPERATION TREATY

From the  
INTERNATIONAL SEARCHING AUTHORITY

To:

PCT

Translation

WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING AUTHORITY

(PCT Rule 43bis.1)

Date of mailing (day/month/year)	
Applicant's or agent's file reference <b>041170woMenn</b>	FOR FURTHER ACTION See paragraph 2 below
International application No. <b>PCT/EP2004/007217</b>	International filing date (day/month/year) <b>02.07.2004</b>
	Priority date (day/month/year) <b>03.07.2003</b>
International Patent Classification (IPC) or both national classification and IPC	
Applicant <b>GRILLO-WERKE AG</b>	

1. This opinion contains indications relating to the following items:

- |                                     |              |  |
|-------------------------------------|--------------|--|
| <input checked="" type="checkbox"/> | Box No. I    | Basis of the opinion   |
| <input checked="" type="checkbox"/> | Box No. II   | Priority   |
| <input type="checkbox"/>            | Box No. III  | Non-establishment of opinion with regard to novelty, inventive step and industrial applicability   |
| <input type="checkbox"/>            | Box No. IV   | Lack of unity of invention   |
| <input checked="" type="checkbox"/> | Box No. V    | Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement |
| <input type="checkbox"/>            | Box No. VI   | Certain documents cited  |
| <input type="checkbox"/>            | Box No. VII  | Certain defects in the international application   |
| <input type="checkbox"/>            | Box No. VIII | Certain observations on the international application  |

2. FURTHER ACTION

If a demand for international preliminary examination is made, this opinion will be considered to be a written opinion of the International Preliminary Examining Authority ("IPEA") except that this does not apply where the applicant chooses an Authority other than this one to be the IPEA and the chosen IPEA has notified the International Bureau under Rule 66.1bis(h) that written opinions of this International Searching Authority will not be so considered.

If this opinion is, as provided above, considered to be a written opinion of the IPEA, the applicant is invited to submit to the IPEA a written reply together, where appropriate, with amendments, before the expiration of 3 months from the date of mailing of Form PCT/ISA/220 or before the expiration of 22 months from the priority date, whichever expires later.

For further options, see Form PCT/ISA/220.

3. For further details, see notes to Form PCT/ISA/220.

Name and mailing address of the ISA/EP	Authorized officer
Facsimile No.	Telephone No.

Form PCT/ISA/237 (cover sheet) (January 2004)

WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING AUTHORITY

International application No.

PCT/EP2004/007217

Box No. 1 Basis of this opinion

1. With regard to the language, this opinion has been established on the basis of the international application in the language in which it was filed, unless otherwise indicated under this item.
- ☐ This opinion has been established on the basis of a translation from the original language into the following language \_\_\_\_\_, which is the language of a translation furnished for the purposes of international search (under Rule 12.3 and 23.1(b)).
2. With regard to any nucleotide and/or amino acid sequence disclosed in the international application and necessary to the claimed invention, this opinion has been established on the basis of:
- a. type of material
- ☐ a sequence listing
- ☐ table(s) related to the sequence listing
- b. format of material
- ☐ in written format
- ☐ in computer readable form
- c. time of filing/furnishing
- ☐ contained in the international application as filed.
- ☐ filed together with the international application in computer readable form.
- ☐ furnished subsequently to this Authority for the purposes of search.
3. ☐ In addition, in the case that more than one version or copy of a sequence listing and/or table(s) relating thereto has been filed or furnished, the required statements that the information in the subsequent or additional copies is identical to that in the application as filed or does not go beyond the application as filed, as appropriate, were furnished.
4. Additional comments:

WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING AUTHORITY

International application No.

PCT/EP2004/007217

Box No. II

Priority

1. ☒ The following document has not yet been furnished:
- ☒ copy of the earlier application whose priority has been claimed (Rule 43bis.1 and 66.7(a)).
  - ☐ translation of the earlier application whose priority has been claimed (Rule 43bis.1 and 66.7(b)).
- Consequently it has not been possible to consider the validity of the priority claim. This opinion has nevertheless been established on the assumption that the relevant date is the claimed priority date.
2. ☐ This opinion has been established as if no priority had been claimed due to the fact that the priority claim has been found invalid (Rules 43bis.1 and 64.1). Thus for the purposes of this opinion, the international filing date indicated above is considered to be the relevant date.
3. Additional observations, if necessary:

Form PCT/ISA/237 (Box No. II) (January 2004)

**WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING AUTHORITY**

International application No.

PCT/EP2004/007217

Box No. V	Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement		
<b>1. Statement</b>			
Novelty (N)	Claims	1-17	YES
	Claims		NO
Inventive step (IS)	Claims	1-17	YES
	Claims		NO
Industrial applicability (IA)	Claims	1-17	YES
	Claims		NO
<b>2. Citations and explanations:</b>			
<p>1. Reference is made to the following document:</p> <p style="margin-left: 40px;">D1: DE 197 48 105 C</p>			
<p>2. Document D1 is considered to be closest prior art. It discloses a method for production of multi-layered surface protection for reinforced concrete, by thermal spray application, to the reinforced concrete, of a first layer composed of zinc or of zinc alloys. The zinc layer is electrically interconnected with the reinforcement and is also coated with a low-viscosity polyurethane resin (see claim 1). The polyurethane resin layer is applied so thinly that no coherent film is formed (see claim 2). Once the polyurethane layer has hardened, an epoxy resin layer can also be applied (see claim 3).</p> <p>The difference between the subject matter of the present independent claims 1 and 14 and the disclosure of D1 is that the low-viscosity polymer applied to the zinc layer forms a coherent film. The subject matter of the independent claims is therefore novel (PCT Article 33(2)).</p>			
<p>3. The technical effect achieved via the application of the low-viscosity polymer in the form of a coherent film is that</p> <p style="margin-left: 20px;">a) the pores are sealed and absorption of the binder during application of further layers is therefore inhibited, and</p> <p style="margin-left: 20px;">b) penetration of air, moisture and substances injurious to a coating, for example alkaline components, from the substrates</p>			

Form PCT/ISA/237 (Box No. V) (January 2004)



WRITTEN OPINION OF THE  
INTERNATIONAL SEARCHING AUTHORITY

International application No.

PCT/EP2004/007217

Box No. V

Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or industrial applicability:  
citations and explanations supporting such statement

located under the layers into the layers located thereupon is inhibited.

Since the prior art does not render obvious the achievement of this effect via the formation of the low-viscosity polymer layer in the form of a coherent film, the subject matter of the independent claims involves an inventive step (PCT Article 33(3)).

4. In relation to PCT Article 6, it should be noted that dependent claim 15 is not clearly defined because it comprises no additional feature over independent claim 14.